

## Abstract

To provide an NO<sub>x</sub> removal catalyst management unit for use with an NO<sub>x</sub> removal apparatus, the management unit detecting an NO<sub>x</sub> removal catalyst layer that is actually deteriorated, whereby the deteriorated catalyst layer can be effectively replaced by a new catalyst layer, and to provide a method for managing the NO<sub>x</sub> removal catalyst.

The management unit for managing a plurality of NO<sub>x</sub> removal catalyst layers provided in a flue gas NO<sub>x</sub> removal apparatus includes NO<sub>x</sub> measurement means 16A through 16E for determining NO<sub>x</sub> concentrations on the inlet and outlet sides of respective NO<sub>x</sub> removal catalyst layers 14A through 14D; NH<sub>3</sub> measurement means 17A through 17E for determining NH<sub>3</sub> concentrations on the inlet and outlet sides of the same NO<sub>x</sub> removal catalyst layers; and percent NO<sub>x</sub> removal determination means 18 for determining percent NO<sub>x</sub> removal ( $\eta$ ) on the basis of an inlet mole ratio (i.e., inlet NH<sub>3</sub>/inlet NO<sub>x</sub>).